

Clearwater National Forest

Fish Habitat Report - Detailed Reach Summaries

Stream Name: Meadow Creek

HUC Code: 170601080103

Survey Year: 2018

Transect Spacing: 30

Survey Length: 420

| <i>Reach</i> | <i>Length</i> | <i>% of Channel Gradient</i> | <i># Transects</i> | <i>Channel Type</i> |
|--------------|---------------|------------------------------|--------------------|---------------------|
| mdw95 | 420 | 100.0% | 14 | |

| Variable | Avg | Sum | Min | Max |
|----------|-----|-----|-----|-----|
|----------|-----|-----|-----|-----|

Channel Characteristics

| | | | | |
|---------------------------|--------|------|-----|------|
| Average Stream Depth (cm) | 14.5 | | 2.0 | 41.8 |
| Maximum Depth (cm) | 27.4 | | 8 | 79 |
| Stream Width (m): | 3.37 | | | |
| Bank Erosion (m/km) | | 29.8 | | |
| Bank Stability % | 97.02% | | | |
| % Gradient (transects): | 3.4 | | | |

Habitat Characteristics

| | | | | |
|-------------------------------|--------|--|-------|-------|
| Pool Quality Rating: | 1.40 | | 1 | 3 |
| Pool Width (m): | 4.7 | | 2.5 | 8.5 |
| Instream Cover Index | 1.86 | | 1 | 4 |
| Bank Stability Index | 3.79 | | 3 | 5 |
| Bank Cover Index | 3.93 | | 0 | 5 |
| Acting Debris (no./100m) | 24.5 | | 6.7 | 43.3 |
| Large Woody Debris (no./100m) | 0.0 | | 0.0 | 0.0 |
| Potential Debris(no./100 m) | 64.5 | | 28.0 | 133.0 |
| Primary Pools (no./km) | 88.1 | | 88.10 | |
| High Quality Pools (no./km) | 0.0 | | | |
| Sum Surface Area (Pool Type) | 1027.5 | | | |
| % Pool (all Pool like types): | 72.6% | | | |

All pool like types include large pools, pocketwater, alcoves, runs and pool-runs. Refer to the Habitat Type breakdowns for the % of actual primary pools

| Pacfish Averages for wood and pools | Avg | Min | Max |
|-------------------------------------|-------|-------|-------|
| Acting Debris (no./mile) | 394.6 | 107.3 | 697.2 |
| Large Woody Debris (no./mile) | 0.0 | 0.0 | 0.0 |
| Primary Pools (no./mile) | 141.7 | | |
| High Quality Pools (no./mile) | 0.0 | | |

Cobble Embeddedness

| | Cobble Embeddedness | Adjusted Cobble Embeddedness |
|-------------------------------|---------------------|------------------------------|
| glide | 100.0 | |
| pocketwater | -1.0 | |
| pool | 100.0 | |
| riffle | 48.0 | |
| run | 97.5 | |
| run pool | 100.0 | |
| run riffle | 100.0 | |
| Average Reach CE (unweighted) | 85.2 | |

Habitat types - Average Widths (meters)

| Variables | Mean | Min | Max | Surface Area (m2) | Percentage of Total |
|-------------------------|------|-----|-----|-------------------|---------------------|
| pool | 4.7 | 2.5 | 8.5 | 699 | 49.4% |
| riffle | 1.9 | 0.4 | 3.4 | 168 | 11.9% |
| run | 1.8 | 1.3 | 2.5 | 218 | 15.4% |
| glide | 3.2 | 3.2 | 3.2 | 96 | 6.8% |
| pocketwater | 1.0 | 1.0 | 1.0 | 30 | 2.1% |
| run riffle | 1.4 | 1.0 | 1.6 | 123 | 8.7% |
| run pool | 2.7 | 2.7 | 2.7 | 81 | 5.7% |
| Total Surface Area (m2) | | | | 1415 | 100.0% |

Primary Habitat Functions - average widths

| Variables | Mean | Min | Max | Surface Area | Percentage of Total |
|--------------------------|------|-----|-----|--------------|---------------------|
| — missing data | 0.4 | 0.4 | 0.4 | 12 | 0.8% |
| unusable | 1.0 | 1.0 | 1.0 | 30 | 2.1% |
| summer rearing | 2.5 | 1.0 | 6.1 | 1119 | 79.1% |
| winter rearing | 8.5 | 8.5 | 8.5 | 253.5 | 17.9% |
| Total Surface Area (m2): | | | | 1415 | 100.0% |

Spawning Habitat Subreport (square Meters)

Spawning habitat totals for Meadow Creek, mdw95

| | | Sum | % of Total |
|---------------------------|---------------|-----|------------|
| <i>Steelhead (spring)</i> | <i>Good</i> | | |
| | <i>Fair</i> | | |
| | <i>Poor</i> | | |
| | <i>Total:</i> | | |
| | | | |
| <i>Chinook (fall)</i> | <i>Good</i> | | |
| | <i>Fair</i> | | |
| | <i>Poor</i> | | |
| | <i>Total:</i> | | |
| | | | |
| <i>Resident (spring)</i> | <i>Good</i> | | |
| | <i>Fair</i> | 1 | 0.07% |
| | <i>Poor</i> | | |
| | <i>Total:</i> | | |
| | | | |
| <i>Resident (fall)</i> | <i>Good</i> | | |
| | <i>Fair</i> | | |
| | <i>Poor</i> | | |
| | <i>Total:</i> | | |
| | | | |

Predominant Substrates

| Predominant Substrate | Surface Area (square meters) | % of Total Area |
|-----------------------------------|---------------------------------|-----------------|
| — missing data | 132 | 9.3 |
| small rubble (cobble) 7.6-15.2 cm | 81 | 5.7 |
| coarse gravel 2.5-7.6 cm | 381 | 26.9 |
| small gravel 0.6-2.6 cm | 276 | 19.5 |
| sand <0.6 cm | 47 | 3.3 |
| silt | 245 | 17.3 |
| organic debris | 254 | 17.9 |
| Total Surface Area | 1414.5 | |

Pool Creators

| Pool Creators | Percentage of Total Pool Area in Stratum | Mean Pool Rating |
|--------------------|---|---------------------|
| large woody debris | 85.0 | 2.50 |
| boulders / bedrock | 15.0 | 1.00 |
| All Pools | 100.0 | 2.0 |

Pool Ratings

| Habitat Type | Average Pool Rating | Min | Max |
|--------------------------------------|---------------------|-----|-----|
| pool | 1.40 | 1 | 3 |
| Average Pool Rating (all pool types) | 1.40 | 1 | 3 |

Riparian Vegetation

| Riparian Dominant/Subdominant Combinations | | % of Scheme within the reach |
|--|-------------------------------|---------------------------------|
| Dominant | Subdominant | |
| Forbs/Grasses (not meadow | and Alder | 92.9% |
| Cedar | and Forbs/Grasses (not meadow | 7.1% |